GROUNDWATER REPLENISHMENT

The Coachella Valley’s annual average of three inches of rain along with snowmelt from surrounding mountains is not nearly enough to replenish the groundwater that is pumped from the local groundwater basin to meet water demands. Coachella Valley Water District (CVWD) and Desert Water Agency (DWA) have been working for decades to eliminate overdraft of the groundwater basin through a successful groundwater replenishment program and by implementing water management practices that protect supplies for future generations.

U.S. GEOLOGICAL SURVEY REPORT (USGS)

A 2020 USGS report shows an increase in valley groundwater levels. The report identified the following three initiatives by CVWD that have been most effective in improving groundwater conditions in some of the most overdrafted areas:

- Colorado River water use through the Mid-Valley Pipeline project since 2006 to reduce groundwater pumping.
- Budget-based, tiered water rates in place since 2009 that have contributed to conservation.

WATER SOURCES

- **Colorado River** water via the 123-mile Coachella Canal. CVWD’s federal contracted supply of Colorado River water is 453,000 acre-feet.
- **State Water Project (SWP)** water (from the Sacramento Bay Delta) is exchanged for Metropolitan Water District of Southern California’s Colorado River water since there is no direct pipeline connection to the Coachella Valley. This exchange saves agencies from building an estimated $1.6 billion pipeline to receive SWP water from Northern California. Together, CVWD and DWA’s contracted supply is 194,100 acre-feet.
- Natural run off from local, mountain streams naturally percolate into the aquifer. On average, only about 62,000 acre-feet is replenished naturally.

REPLENISHMENT FACILITIES

- Whitewater River Groundwater Replenishment Facility
- Mission Creek Groundwater Replenishment Facility
- Thomas E. Levy Groundwater Replenishment Facility
- Palm Desert Replenishment Facility, Phase I

REPLENISHMENT BY THE NUMBERS

- 4.5 million acre-feet of imported water has been replenished into the aquifer at three facilities since 1973.
- 3 million acre-feet of water is enough to serve the water needs for 6 million families of four in one year.
- 63,610 acre-feet was replenished at the three replenishment facilities in 2021.
- 99% of the Coachella Valley’s domestic water supply is groundwater.
- 400,000 people in the Coachella Valley use groundwater.
- 7,000 local businesses use groundwater.

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